Date of Patent: [45]

* Sep. 3, 1991

[54] INSULATION STRUCTURE FOR **APPLIANCES**

[75] Inventor: Thomas E. Nelson, Crestwood, Ky.

[73] Assignee: Soltech, Inc., Shelbyville, Ky.

The portion of the term of this patent [*] Notice:

subsequent to Jan. 15, 2008 has been

disclaimed.

[21] Appl. No.: 509,899

[22] Filed: Apr. 16, 1990

Related U.S. Application Data

Continuation of Ser. No. 220,027, Jul. 15, 1988, Pat. [63] No. 4,985,106, which is a continuation-in-part of Ser. No. 177,439, Apr. 4, 1988, abandoned, which is a continuation-in-part of Ser. No. 931,150, Nov. 17, 1986.

[51]	Int. Cl. ⁵	A47B 77/06
[52]	U.S. Cl	312/228
[58]	Field of Search 312/214,	228; 52/406,

[56] References Cited

U.S. PATENT DOCUMENTS

4,693,526 9/1987 Spiegel	4,693,526	4/1956 1/1957 6/1957 4/1972 5/1974 11/1982 9/1987	
4,825,089 4/1989 Lindsay 52/406 X			

4,985,106 1/1991 Nelson 312/229 X

Primary Examiner—Joseph Falk

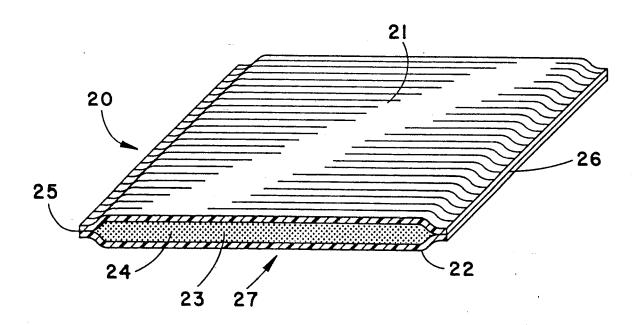
Attorney, Agent, or Firm-Woodard, Emhardt,

Naughton, Moriarty & McNett

ABSTRACT

An insulation panel for an appliance for reducing one or more undesirable side effects due to the operation of the appliance such as noise, vibration and heat includes a first layer of enclosing material such as polyethylene or polypropylene which has greater tear resistance and configuring this first layer of enclosing material to a size and shape based upon the appliance and the area of the appliance to be covered. Next, a second layer of similar enclosing material is selected and configured so as to having a matching peripheral edge or contour with the first layer. Ultimately these two layers of enclosing material are joined together around their peripheral edges so as to define and completely enclose an interior cavity. Into this interior cavity a blanket of insulating material is dispersed of a generally uniform blanket thickness. In certain applications, the insulating material includes a binder so that the insulating material will not shift or settle relative to the enclosed cavity. The particular insulating material may either be selected for acoustical insulation, vibration dampening and/or thermal insulation. A singular purpose of the insulating material may be desired or multiple uses may be desired in which case part of the enclosed cavity may include acoustical insulation and part of the enclosed cavity may include vibration-dampening material.

4 Claims, 6 Drawing Sheets



52/743